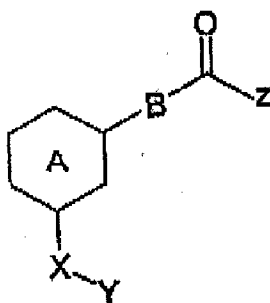


**AMENDMENTS TO THE CLAIMS:**

Please amend the claims as follows:

1. (Currently Amended) A compound of formula I, or a pharmaceutically  
~~pharmaceutically~~ acceptable salt thereof,



wherein

Z is  $\text{OR}^4$  or  $\text{NR}^1\text{R}^2$  wherein each of  $\text{R}^1$  and  $\text{R}^2$  is independently H, or a hydrocarbonyl group;

X-Y is selected from

$-\text{C}\equiv\text{C}-(\text{CH}_2)_p-\text{Y}$

$-\text{C}(\text{R}^5)=\text{C}(\text{R}^6)-(\text{CH}_2)_q-\text{Y}$ ; and

$-\text{C}(\text{R}^5)(\text{R}^6)\text{C}(\text{R}^7)(\text{R}^8)-(\text{CH}_2)_r-\text{Y}$ ;

wherein each of  $\text{R}^5$ ,  $\text{R}^6$ ,  $\text{R}^7$ , and  $\text{R}^8$  is independently H or alkyl, and each of p, q and r is independently 2, 3, or 4

~~X is an alkylene, alkenylene, or alkynylene group, each of which may be optionally substituted by one or more substituents selected from alkyl,  $\text{COOH}$ ,  $\text{CO}_2$ -alkyl, akenyl,  $\text{CN}$ ,  $\text{NH}_2$ , hydroxy, halo, alkoxy,  $\text{CF}_3$ , and nitro;~~

Y is a polar functional group selected from  $\text{OH}$ ,  $\text{NO}_2$ ,  $\text{CN}$ ,  $\text{COR}^3$ ,  $\text{COOR}^3$ ,  $\text{NR}^3\text{R}^4$ ,

$\text{CONR}^3\text{R}^4$ ,  $\text{SO}_3\text{H}$ ,  $\text{SO}_2\text{-R}^3\text{SO}_2\text{-R}^3$ ,  $\text{SO}_2\text{NR}^3\text{R}^4$  and  $\text{CF}_3$ , where each of  $\text{R}^3$  and  $\text{R}^4$  is independently H or a hydrocarbyl group;

A is phenyl-~~or pyridyl~~; and

B is  $(\text{CH}_2)_n$  where n is 0;

with the proviso that:

(i) when A is phenyl, and Z is OH, X-Y is other than  $\text{C}\equiv\text{C}-(\text{CH}_2)_2\text{OH}$ ,  $\text{C}\equiv\text{C}--(\text{CH}_2)_2\text{OH}$ ,  $\text{C}\equiv\text{C}-(\text{CH}_2)_2\text{CO}_2\text{Me}$ ,  $(\text{CH}_2)_4\text{CO}_2\text{H}$ ; and

(ii) when A is phenyl, and Z is OMe, X-Y is other than  $\text{C}\equiv\text{C}-(\text{CH}_2)_4\text{OH}$ ;  $-(\text{CH}_2)_4\text{-CHO}$ , *cis*- $\text{CH}=\text{CH}-(\text{CH}_2)_3\text{OH}$ , *trans*- $\text{CH}=\text{CH}-(\text{CH}_2)_3\text{OH}$ ;

and wherein the compound is other ~~than than~~ 1-(N-octylcarbamoyl)methyl-3-carboxmidopyridinium chloride, 3 -methylcarbamoyl-1-dodecyloxycarbonylmethyl-pyridinium or 6-aminomethylpyridine-2-carboxylic acid ethyl ester.

2. (Currently Amended) A compound according to claim 1 wherein Y is selected from  $[[\text{ON}]]\underline{\text{CN}}$ , OH,  $\text{COOR}^3$ ,  $\text{SO}_2\text{NR}^3\text{R}^4$ ,  $\text{CONR}^3\text{R}^4$ , where each of  $\text{R}^3$  and  $\text{R}^4$  is independently H or a hydrocarbyl group.

3. (Previously Presented) A compound according to claim 1 wherein each of  $\text{R}^1$ ,  $\text{R}^2$ ,  $\text{R}^3$  and  $\text{R}^4$  is independently H, an alkyl group, an aryl group, or a cycloalkyl group, each of which may be optionally substituted.

4. (Previously Presented) A compound according to claim 1 wherein Y is selected from OH, CN,  $\text{COOR}^3$ ,  $\text{CONR}^3\text{R}^4$ , where each of  $\text{R}^3$  and  $\text{R}^4$  is independently H or an optionally substituted alkyl group.

5. (Previously Presented) A compound according to claim 1 wherein Y is selected from OH, CN, COOMe, COOH, CONH<sub>2</sub>, CONHMe and CONMe<sub>2</sub>.

Claim 6. (Canceled)

7. (Previously Presented) A compound according to claim 1 wherein X-Y is selected from

-C≡C-(CH<sub>2</sub>)<sub>p</sub>-Y; and

-CH=CH-(CH<sub>2</sub>)<sub>q</sub>-Y;

wherein each of p and q is independently 2, 3 or 4.

8. (Currently Amended) A compound according to claim [[6]]1 wherein X-Y is *cis*-C(R<sup>5</sup>)=C(R<sup>6</sup>)-(CH<sub>2</sub>)<sub>q</sub>-Y and q is 2, 3 or 4.

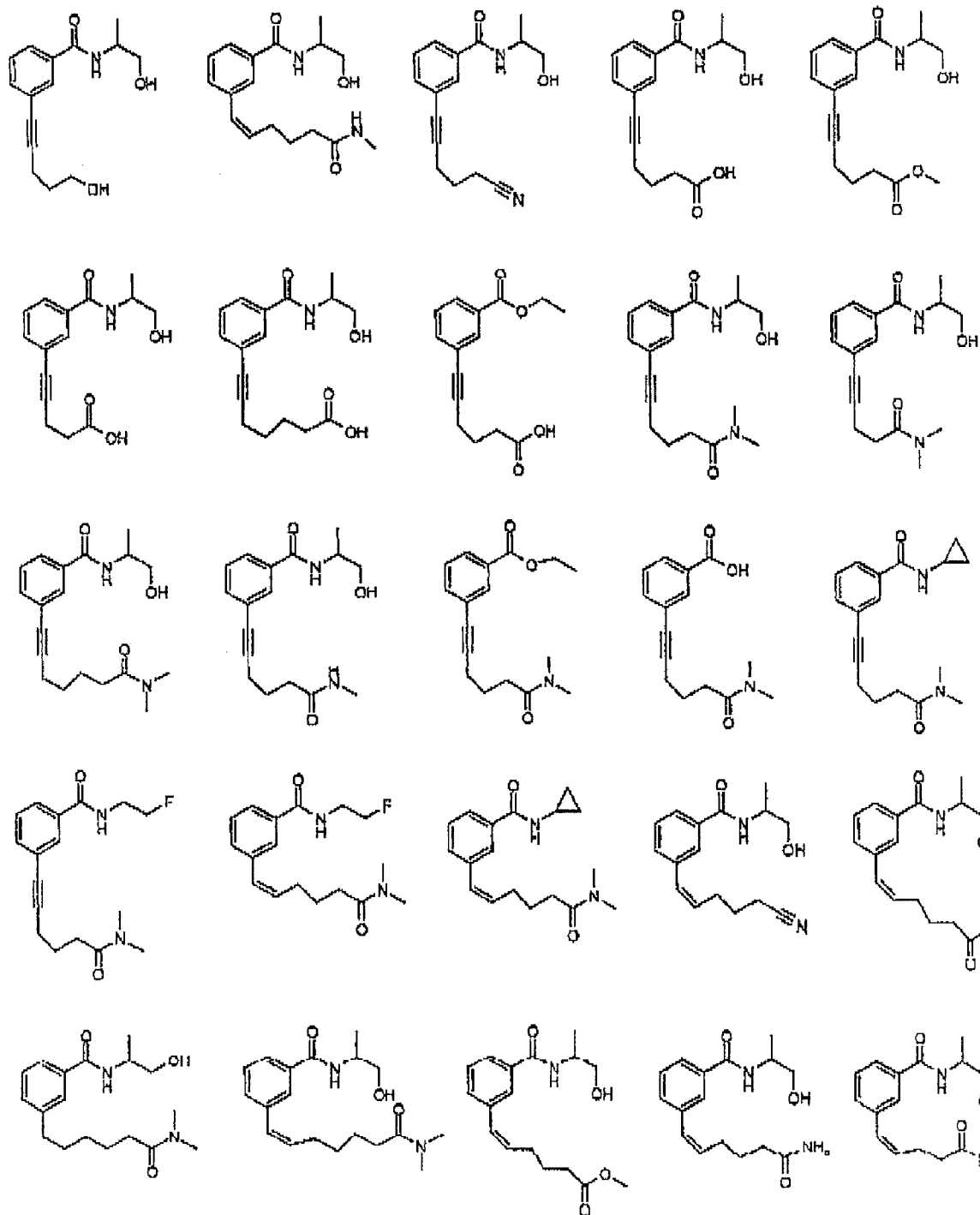
9. (Previously Presented) A compound according to claim 1 wherein X-Y is -C(Me)<sub>2</sub>-CH<sub>2</sub>-(CH<sub>2</sub>)<sub>r</sub>-Y and r is 2, 3 or 4.

10. (Original) A compound according to claim 1 wherein A is phenyl.

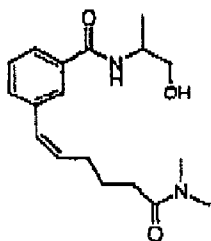
11. (Previously Presented) A compound according to claim 1 wherein Z is OR<sup>1</sup> or NR<sup>1</sup>R<sub>2</sub> and each of R<sup>1</sup> and R<sup>2</sup> is independently H, an alkyl or a cycloalkyl group, each of which may be optionally substituted by one or more OH or halogen groups.

12. (Previously Presented) A compound according to claim 1 wherein Z is selected from OH, OEt, NHCH<sub>2</sub>CH<sub>2</sub>F, NH-cyclopropyl, NHCH(Me)CH<sub>2</sub>OH and NHCH<sub>2</sub>CH<sub>2</sub>OH

13. (Previously Presented) A compound according to claim 1 which is selected from the following:

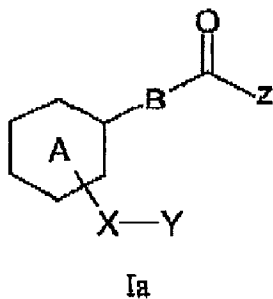


14. (Original) The compound of claim 13 which is



15. (Original) The compound of claim 14 which is in the form of a racemic mixture.

16. (Currently Amended) A method of treating a muscular disorder in a subject in need thereof, said method comprising administering to the subject ~~Use of a~~ a compound of formula Ia, or a pharmaceutically acceptable salt thereof,



wherein

Z is  $OR^1$  or  $NR_1R_2$  wherein each of  $R_1$  and  $R_2$  is independently H, or a hydrocarbyl group;

X is an alkylene, alkenylene, or alkynylene group, each of which may be optionally substituted;

Y is a polar functional group;

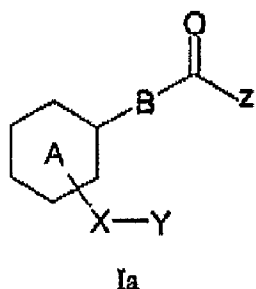
A is an aryl or heteroaryl group, each of which may be optionally substituted; and

B is  $(CH_2)_n$  where n is 0, 1, 2, 3, 4 or 5;

~~in the preparation of a medicament for treating a muscular disorder.~~

17. (Currently Amended) A method ~~[[Use]]~~ according to claim 16 wherein the muscular disorder is a neuromuscular disorder.

18. (Withdrawn – Currently Amended) A method of treating spasticity and tremors in a subject in need thereof, said method comprising administering to the subject ~~Use of~~ a compound of formula Ia, or a pharmaceutically acceptable salt thereof,



wherein

Z is  $OR^1$  or  $NR^1R^2$  wherein each of  $R^1$  and  $R^2$  is independently H, or a hydrocarbyl group;

X is an alkylene, alkenylene, or alkynylene group, each of which may be optionally substituted;

Y is a polar functional group;

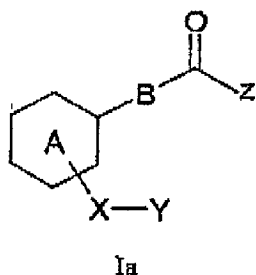
A is an aryl or heteroaryl group, each of which maybe optionally substituted; and

B is  $(CH_2)_n$  where n is 0, 1, 2, 3, 4 or 5;

~~in the preparation of a medicament for controlling spasticity and tremors.~~

19. (Withdrawn – Currently Amended) A method of treating a gastrointestinal disorder in a subject in need thereof, said method comprising administering to the

subject ~~Use of~~ a compound of formula Ia, or a pharmaceutically ~~pharmaceutically~~  
acceptable salt thereof,



wherein

Z is OR<sub>1</sub> or NR<sub>1</sub>R<sub>2</sub> wherein each of R<sub>1</sub> and R<sub>2</sub> is independently H, or a hydrocarbyl group;

X is an alkylene, alkenylene, or alkynylene group, each of which may be optionally substituted;

Y is a polar functional group;

A is an aryl or heteroaryl group, each of which may be optionally substituted; and

B is (CH<sub>2</sub>)<sub>n</sub> where n is 0, 1, 2, 3, 4 or 5;

~~in the preparation of a medicament for treating a gastrointestinal disorder.~~

20. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 19 wherein the gastrointestinal disorder is a gastric ulcer.

21. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 19 wherein the gastrointestinal disorder is Crohn's disease.

22. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 19 wherein the gastrointestinal disorder is secretory diarrhoea.

23. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 19 wherein the gastrointestinal disorder is paralytic ileus.

24. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein said modulator selectively modulates peripheral cannabinoid receptors.

25. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein said compound selectively modulates peripheral cannabinoid receptors over central cannabinoid receptors.

26. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein the compound binds substantially exclusively to peripheral cannabinoid receptors.

27. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein the compound is a cannabinoid receptor agonist.

28. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein the compound does not substantially agonise central cannabinoid receptors.

29. (Withdrawn – Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein the compound is substantially excluded from the CNS.

30. (Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein Y is selected from NO<sub>2</sub>, CN, OR<sup>3</sup>, COR<sup>3</sup>, COOR<sup>3</sup>, NR<sup>3</sup>R<sup>4</sup>, CONR<sup>3</sup>R<sup>4</sup>, SO<sub>3</sub>H, SO<sub>2</sub>-R<sup>3</sup>, SO<sub>2</sub>NR<sup>3</sup>R<sup>4</sup> and CF<sub>3</sub>, where each of R<sup>3</sup> and R<sup>4</sup> ~~NO<sub>2</sub>, CN, OR<sub>3</sub>, COR<sub>3</sub>, COOR<sub>3</sub>, NR<sub>3</sub>R<sub>4</sub>, CONR<sub>3</sub>R<sub>4</sub>, SO<sub>3</sub>H, SO<sub>2</sub>-R<sub>3</sub>, SO<sub>2</sub>NR<sub>3</sub>R<sub>4</sub> and CF<sub>3</sub>, where each of R<sub>3</sub> and R<sub>4</sub> is~~ independently H or a hydrocarbyl group.



31. (Currently Amended) A method ~~[[Use ]]~~ compound according to claim 16 wherein Y is selected from CN, COOR<sup>3</sup>, SO<sub>2</sub>NR<sup>3</sup>R<sup>4</sup>, CONR<sup>3</sup>R<sup>4</sup>, where each of R<sup>3</sup> and R<sup>4</sup> is independently H or a hydrocarbyl group.

32. (Currently Amended) A method ~~[[Use ]]~~ according to claim 16 wherein the compound is as defined in any one of claims 1-5 and 7-15.

33. (Withdrawn) A method of treating a disorder associated with the modulation of peripheral cannabinoid receptors, said method comprising administering to a subject in need thereof, a therapeutically effective amount of a compound according to claim 1.

34. (Withdrawn) A method according to claim 33 wherein said disorder is associated with peripheral cannabinoid receptor deactivation.

35. (Withdrawn) A method according to claim 33 wherein the compound binds substantially agonise central cannabinoid receptors.

36. (Withdrawn) A method according to claim 33 wherein the compound binds substantially exclusively to peripheral cannabinoid receptors.

37. (Withdrawn) A method according to any claim 33 wherein the compound is substantially excluded from the CNS.

38. (Previously Presented) A pharmaceutical composition comprising a compound according to claim 1, or a pharmaceutically acceptable salt thereof, admixed with pharmaceutically acceptable diluent, excipient or carrier.

39. (Withdrawn – Currently Amended) An assay method of identifying compounds capable of modulating cannabinoid receptor activity, said method comprising using ~~Use of~~ a compound of formula Ia, or pharmaceutically acceptable salt

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Amendment  
Monday, July 13, 2009

thereof, as defined in claim 16 to identify said compounds ~~in an assay for identifying further compounds capable of modulating cannabinoid receptor activity.~~

40. (Withdrawn – Currently Amended) The method ~~[[Use ]]~~ according to claim 39 wherein the assay is a competitive binding assay.